APPENDIX B

(1) FEDERAL AVIATION REGULATION PART 93, SUBPART M
 (2) RECOMMENDED STANDARD VFR ARRIVAL & DEPARTURE PROCEDURES & PATTERNS

PART 93--SPECIAL AIR TRAFFIC RULES AND AIRPORT TRAFFIC PATTERNS

Subpart M--Ketchikan International Airport Traffic Rule

Source: Docket No. 14687, Amdt. 93-33, 41 FR 14879, Apr. 8, 1976, unless otherwise noted

Sec. 93.151 Applicability.

This subpart prescribes special air traffic rules and communications requirements for persons operating aircraft, under VFR--

- (a) To, from, or in the vicinity of the Ketchikan International Airport or Ketchikan Harbor.
- (b) Within the airspace below 3,000 feet MSL within the lateral boundary of the surface area of the Ketchikan Class E airspace regardless of whether that airspace is in effect.

[Docket No. 26653, Amdt. No. 93-63, 56 FR 48094, Sept. 23, 1991, as amended at 58 FR 32839, June 14, 1993; Amdt. 93-64, 56 FR 65662, Dec. 17, 1991; 57 FR 11575, Apr. 6, 1992; 58 FR 32839, June 14, 1993]

EFFECTIVE DATE NOTE: Amdt. 93-64, 56 FR 65662, Dec. 17, 1991; 57 FR 11575, Apr. 6, 1992, as amended at 58 FR 32839, June 14, 1993, revised the introductory text of Sec. 93.151 effective September 16, 1993. For the convenience of the user, the superseded text in effect until Sept. 16, 1993, is set forth as follows:

Sec. 93.151 Applicability.

This subpart prescribes special air traffic rules and communications requirements for persons operating aircraft, under VFR--

- (a) To, from, or in the vicinity of the Ketchikan International Airport or Ketchikan Harbor.
- (b) Within that airspace below 3,000 feet MSL within the lateral boundary of the surface area of the Ketchikan Class E airspace regardless of whether that airspace is in effect.

[Doc. No. 26653, 56 FR 48094, Sept. 23, 1991, as amended by Amdt. 93-64, 58 FR 32839, June 14, 1993]

Sec. 93.153 Communications.

(a) When the Ketchikan Flight Service Station is in operation, no person may operate an aircraft within the airspace specified in Sec. 93.151, or taxi

onto the runway at Ketchikan International Airport, unless that person has established two-way radio communications with the Ketchikan Flight Service Station for the purpose of receiving traffic advisories and continues to monitor the advisory frequency at all times while operating within the specified airspace.

- (b) When the Ketchikan Flight Service Station is not in operation, no person may operate an aircraft within the airspace specified in Sec. 93.151, or taxi onto the runway at Ketchikan International Airport, unless that person continuously monitors and communicates, as appropriate, on the designated common traffic advisory frequency as follows:
 - (1) For inbound flights. Announces position and intentions when no less than 10 miles from Ketchikan International Airport, and monitors the designated frequency until clear of the movement area on the airport or Ketchikan Harbor.
 - (2) For departing flights. Announces position and intentions prior to taxiing onto the active runway on the airport or onto the movement area of Ketchikan Harbor and monitors the designated frequency until outside the airspace described in Sec. 93.151 and announces position and intentions upon departing that airspace.
- (c) Notwithstanding the provisions of paragraphs (a) and (b) of this section, if two-way radio communications failure occurs in flight, a person may operate an aircraft within the airspace specified in Sec. 93.151, and land, if weather conditions are at or above basic VFR weather minimums.

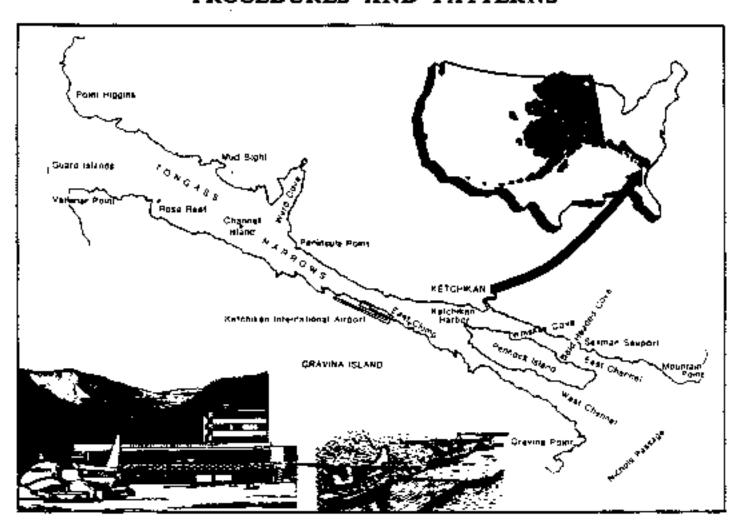
[Docket No. 26653, Amdt. No. 93-63, 56 FR 48094, Sept. 23, 1991]

Sec. 93.155 Aircraft operations.

- (a) When an advisory is received from the Ketchikan Flight Service Station stating that an aircraft is on final approach to the Ketchikan International Airport, no person may taxi onto the runway of that airport until the approaching aircraft has landed and has cleared the runway.
- (b) Unless otherwise authorized by ATC, each person operating a large airplane or a turbine engine powered airplane shall--
 - (1) When approaching to land at the Ketchikan International Airport, maintain an altitude of at least 900 feet MSL until within three miles of the airport; and
 - (2) After takeoff from the Ketchikan International Airport, maintain runway heading until reaching an altitude of 900 feet MSL.

KETCHIKAN

RECOMMENDED STANDARD VFR ARRIVAL AND DEPARTURE PROCEDURES AND PATTERNS



TONGASS AIRCRAFT PILOTS ASSOCIATION and



US Department of Transportation
Federal Arigition Aziministration
A/askan_Region

Recommended Standard Operating Practices and Procedures

for Aircraft Arriving and Departing Ketchikan, Alaska

Aircraft arriving and departing the Katchikan area are furnaled down the Tongass Narrows. This results in aircraft passing very close in an area with little maneuvering room. In response to the recognized higher—than-normal risks and aviation impact on the community, the Tongass Aircraft Pilots Association developed VFR patterns and procedures to enhance aviation safety and mitigate aircraft noise problems in the community.

In addition to normal good operating practices, aircraft pilots are encouraged to use the following VFR patterns to enter or depart the Ketchikan Harbor or Ketchikan International Airport and to pay special attention to the following particular good operating practices:

- 1. <u>SEE AND BE SEEN.</u> Use your head on a swivel technique, constantly scanning the eky.
- 2. AVOID INFLIGHT PREIXCUPATION. Avoid distraction in the aircraft, such as passengers, paperwork, flight instruments, aircraft systems, conversation, activity on the surface that is not pertinent to flight.
- 3. PAY STRICT ATTENTION TO TRAFFIC ADVISORIES ON THE RADIO. Listen carefully to other aircraft position reports and be sure to report your precise position, altitude, and your intentions without tying up the radio frequency. Example: "Aircraft IO, position, destination" or "Besver One Zero Four Lime Papa, Harbor West to Vallenar Point."
- 4. CHECKING FOR TRAFFIC PRIOR TO WATER TAKEOFF. When load and wind permit, make a 360 degree clearing turn prior to takeoff.
- 5. <u>UPDATE YOUR FOSITION</u>. While closely monitoring the FSS traffic advisory frequency and visually economic for possible conflicting traffic provide updated position, altitude, and intention reports to the FSS.
- 6. <u>USE LANDING LIGHTS</u>. Keep your landing lights ON regardless of weather conditions.
- 7. COMMON COURTESY. Exercise common courtesy and common sense by holding for aircraft on final approach, extending downwind, avoiding simultaneous takeoffs and landings, and otherwise being considerate and safety conscious.
- REPORT WHEN YOU ARE NO LONGER A TRAFFIC FACTOR. Report when you have landed or when you are otherwise no longer a fector for traffic arriving, departing, or transiting the Tongass Nations.
- 9. EXPECT THE UNEXPECTED. These patterns and practices are recommended but are not mandatury, so you cannot be sure that all pilots are following them. In addition, there may be itinerent or no-redio (NDRDO)aircraft in the area that are not following the patterns or procedures.

- 10. PLAN YOUR TAKEOFF AND LANDING. Use noise abatement procedures in consideration of the populated areas on the Revilla shoreline and Pernock Island. If taking off from the harbor and a turn over Pernock Island is required, establish your climb over East Channel and turn right between whiskey Cove and Bald Headed Cove (mid-island) and proceed with the standard departure pattern. If landing at the harbor and a turn over Pernock Island is required, make the crossing at the same mid-island location. Make all turns so as to avoid overflying houses on Pernock Island. Avoid the populated areas north of the Revilla shoreline by remaining over the Narrows until passing Higgins Point or Mountain Point, as appropriate.
- 11. AVOIDANCE OF APPROACH/DEPARTURE COURSE TO THE AIRPORT. Whenever possible, floatplanes should avoid any flight across the runway ends. All aircraft should evoid flight along the extended center line of either Runway II or 29, but particularly between Guard Island and the end of Runway II. Airport crossings should be conducted at mid-field over the airport terminal after reporting crossing altitude to the flight service station.
- 12. EXTREME CAUTION ADVISED. Due to the high terrain on both sides of the Tongass Narrows, sircraft activity is limited to a very narrow airspace area. The VFR airspace is further constricted a good part of the time due to prevailing low osilings. The takeoff and landing of aircraft at as many as eight locations along the Narrows often results in aircraft climbing and descending in potential conflict with each other and transiting aircraft.
- 13. INTITAL VER REPORTING POINTS. Pilots are encouraged to use Vallerar Point and Point Higgins as initial reporting points for both arrivals and departures to and from the west; Mountain Point and Gravina Point for arrivals and departures to and from the east.

Examples:

"Cessna 5188N Peninsula Point, 600 feet climbing, Vallenar West."

"Cassna 5188N Peninsula Point, 500 feet, Point Higgins West."

"N9851Z taxiing airport, Vallenar West."

"N9851Z taxiing airport, Point Higgins West."

"N533ZR airport float, Mountain Point East."

"N5454E harbor, Gravina Point East."

- 14. REPORT DIRECTION OF TAKEOFF. If departing or arriving by other than the recommended pattern, report direction of takeoff or landing to the FSS.
- 15. ARRIVAL/DEPARTURE PATTERN SELECTION. The arrival/departure pattern will be dictated by the wind in Ketchikan Harbor. If the harbor winds are less than five knots, the calm wind pattern will be the Ketchikan Harbor southeast wind pattern.
- 16. PATTERN-IN-USE AND CEMENT. The pattern in use at Ketchikan Hartor will be broadcast on the Ketchikan FSS Automatic Terminal Information Service (ATIS) on VMF frequency 119.9. If the ATIS is out of service, Ketchikan FSS will provide recommended pattern information on the traffic advisory frequency.

SOUTHEAST WIND

Recommended VFR Arrival and Departure Patterns

Ketchikan Harbor and Airport Dock

Harbor Departures: After takeoff, establish climb over East Channel and:

If EASTROUND: Depart east around Mountain Point.

If <u>SOUTHEASTBOUND</u>: Turn right absent the Saxman Seaport and depart via Gravina Point out Nichols Passage.

If <u>WESTBOUND</u>: Turn right between Whiskey Cove and Bald Mesded Cove and cross Pennock Island; proceed west along the south shore of Pennock Island direct to the airport floatplane dock, direct Rosa Reef and west over the channel.

Harbor Arrivals:

If from the <u>EAST OR SOUTHEAST</u>: Enter deserwind over West Channel and proceed downwind over the airport floatplane dock along the Gravina shoreline. Turn right absent Ward Cove and proceed east along the Revilla shore and land at the harbor.

Note: If no other aircraft are inbound to Ketchikan Harbor between Bar Harbor and the airport floatplane dock, a right base turn from East Clump Island is pennitted for final to the harbor.

If from the <u>MEST</u>: Proceed east on the north side of the Tongass Narrows to a point near the tip of Peninsula Point, continue along the Revilla shore and land at the harbor.

Airport Floatplane Dock Departures: After takeoff, cautiously enter and establish climb over East Channel and:

- If EASTROUND: Depart east around Mountain Point.
- If <u>SOUTHEASTHOUND</u>: Turn right aheam the Saxman Seaport and depart via Gravina Point out Nichols Passage.
- If <u>WESTBOUND</u>: Turn right between Whiskey Cove and Bald Headed Cove and cross Perrock Island; proceed west along the south shore of Pernock Island direct to the airport floatplane dock, direct Rosa Reef and west over the channel.

Airport Floatplane Dock Arrivals:

- If from the <u>EAST_OR SOUTHEAST</u>: Enter downwind over West Channel and proceed downwind over the airport floatplane dock along the Gravina shoreline. Turn right abean Ward Cove and proceed direct from near the tip of Peninsula Point to land at the airport dock.
- If from the WEST: Proceed east on the north side of the Tongass Narrows and proceed direct from a point near the tip of Peninsula Point to land at the airport dock.

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SOUTHEAST WIND

RECOMMENDED VFR Arrival and Departure Patterns

For Light Singly Engine and Light Twin Engine Aircraft

Ketchikan International Airport

RUNHAY II DEPARTURES: Meather permitting, runway heading until at of above 900 feet MSL and:

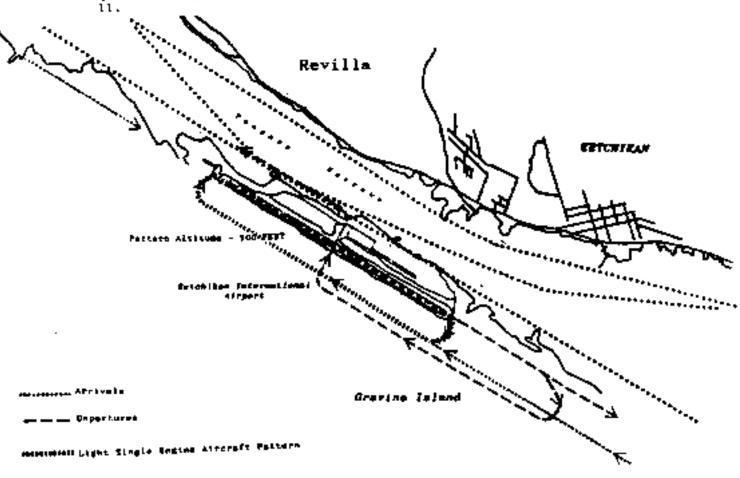
If <u>CASTBOUND</u>; after passing Judy Hill or the southeast end of Pennock Island, climb on course.

if <u>WESTBOUND</u>: turn right entering right downwind to midfield; turn right and cross the airport; join the southeast herbor departure pattern direct to the airport floatplane dock, direct Ross Reef and west over the channel until past Vallenar Point. Resain clear of the approach course to runway 11.

NUNWAY : ARRIVALS - Traffic pattern altitudes should be maintained until necessary to descend for landing unless otherwise required by the applicable distance from clouds criteria (FAR 91.105) AND:

If from the <u>WEST</u>: Enter on a long final and land straight-in unless there is conflicting traffic making right or left traffic; in which case, remain at pattern altitude and make right traffic in sequence to land Runway 11.

If from the <u>EAST OR SOUTHEAST</u>: Enter on a long right downwind north of Judy Hill over Gravina Island and clear of the runway 11 departure course: enter the right downwind airport pattern, sequence with pattern traffic and aircraft on final to land runway



HELICOPTER

SOUTHEAST WIND

RECOMMENDED VFR Arrival and Departure Patterns

Ketchikan, Alaska and Tongass Narrows Area

Departures: After take off, make a climbing left turn to 1000 feet AGL north of Peninsula Point and east of Ward Cove and:

If <u>EASTROUND</u>: proceed east via a route over the Revilla shoreline north of the Tongass Narrows.

If <u>WESTBOUND</u>; proceed west via a route at least 500 yards north of the Revil(a shoreline.

Arrivals:

If from the <u>EAST OR SOUTHEAST</u>: Proceed west to Peninsula Point at 1000 feet AGL via a route at least 500 yards north of the Revilla shoreline inorth of the Tongass Narrows). Descend in a left pattern north of Peninsula Point and east of Ward Cove and land at Peninsula Point.

If from the <u>WEST</u>: Proceed east to Peninsula Point at 1000 feet AGL via the Revilla shoreline (north of the Tongass Narrows). Descend in a left pattern north of Peninsula Point and east of Ward Cove and land at Peninsula Point.

NOTE: If arriving or departing to or from locations other that Peninsula Point: The above routes are recommended with climb or descent patterns in the vicinity of the helipad and well clear of the floatplane routes over the Tongass Narrows.

All helicopter aling loads will be over water.

HELICOPTER CLIMB AND DESCENT PATTERN. PENINSULA POINT IS THE VISUAL PATTERN FIX BECAUSE 99% OF ALL HELICOPTER OPERATIONS ARE TO AND FROM THIS LOCATION.

SOUTHEAST MIND

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WEST WIND

Recommended VFR Arrival and Departure Patterns

Ketchikan Harbor and Airport Dock

<u>Harbor Departures</u>: After takeoff, climb westbound on the north side of the Tongass Narrows along the Revilla shoreline to a point near the tip of Peninsula Point and:

If WESTBOUND: Depart west along the north side of the Narrows until west of Point Higgins and Vallerar Point, then proceed on course.

If <u>EASTROUND</u>: Turn left abeam Ward Cove, proceed east along the Gravina shore over the airport floatplane dock; direct the south shore of Pennock Island and proceed east via the West Channel.

If <u>SOUTHEASTBOUND</u>: Turn left abeam Ward Cove, proceed east elong the Gravina shore over the airport floatplane dock; direct the south shore of Pennock Island and proceed east via the West Channal; turn right abeam Gravina Point and proceed out Nichols Passage.

Harbor Arrivals:

If from the WEST: Enter on a long downwind from the west along the south side of the Tongaes Narrows along the Gravine shoreline; over the airport floatplane dock; direct the south shore of Pennock Island; turn left abeam a point midway between Whiskey Cove and Bald Headed Cove and cross Pennock Island; enter final in the middle of the East Channel and land straight-in at the harbor.

If from the <u>EAST OR SOUTHEAST</u>: Establish over the East Channel on final at a point abeam of Sauman Seaport and land straight-in at the harbor.

<u>Airport Floatplane Dock Departures</u>: After takeoff, climb direct to a point abeam Peninsula Point near the Ravilla shoreline, and:

If <u>WESTHOUND</u>: Depart west along the north side of the Narrows until west of Point Higgins and Vallenar Point, then proceed on course.

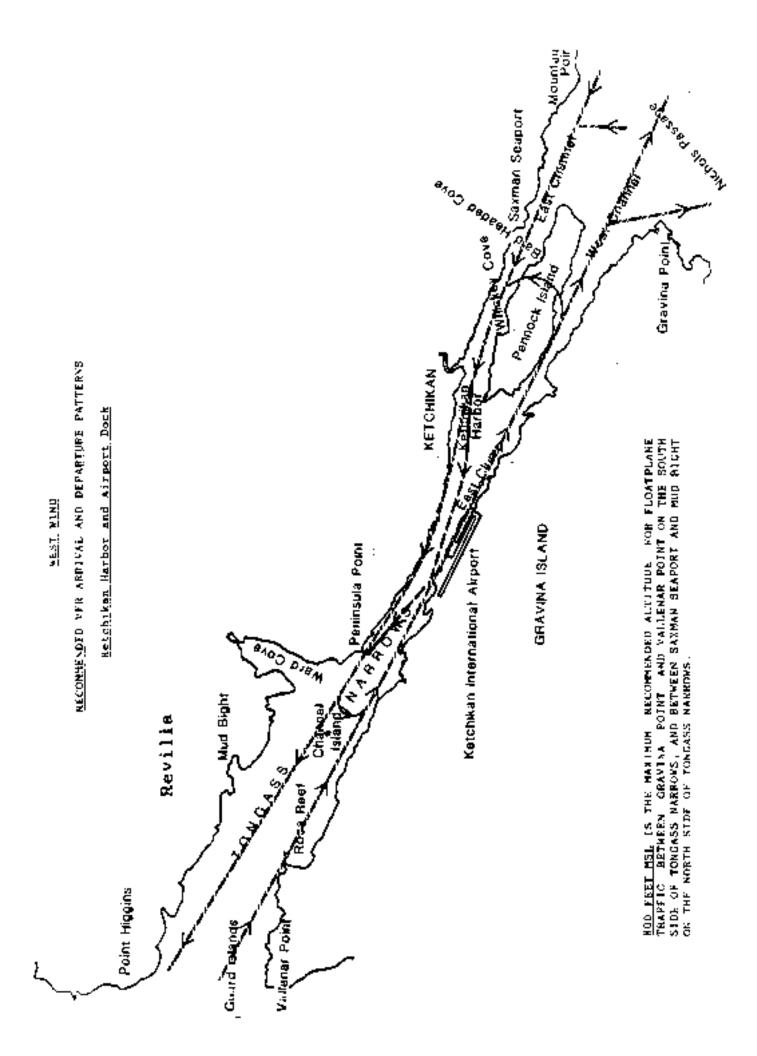
If <u>EASTHOUND</u>: Turn left shear Ward Crows, proceed east along the Gravina share over the airport floatplane dock; direct the south shore of Permock Island and proceed east via the West Channel.

If <u>SOUTHEASTROUND</u>: Turn left abeam Ward Cove, proceed east along the Gravina shore over the sirport floatplane dock: direct the about shore of Pernock Island and proceed east via the West Channel; turn right abeam Gravina Point and proceed out Nichola Passaga.

Airport Floatplene Dock Arrivals:

If from the WEST: Enter on a long downwind from the west along the south side of the Tongass Narrows along the Gravina shoreline; over the airport floatplane dock; direct the south shore of Permock Island; turn left abeam a point midway between Whiskey Cove and Beld Headed Cove and cross Permock Island; enter final in the middle of the East Charmel and land straight-in at the dock.

If from the EAST OR SOUTHEAST: Establish over the East Charmel at a point abeam of Saxman Seaport; proceed west over the charmel to a point abeam of the west end of Permock Island and land straight-in at the dock.



WEST WIND

RECOMMENDED VFR Arrival and Departure Sattemen

For Light Single Engine and Light Twin Engine Licoraft

<u> Necotikan (ncernationa) Airport</u>

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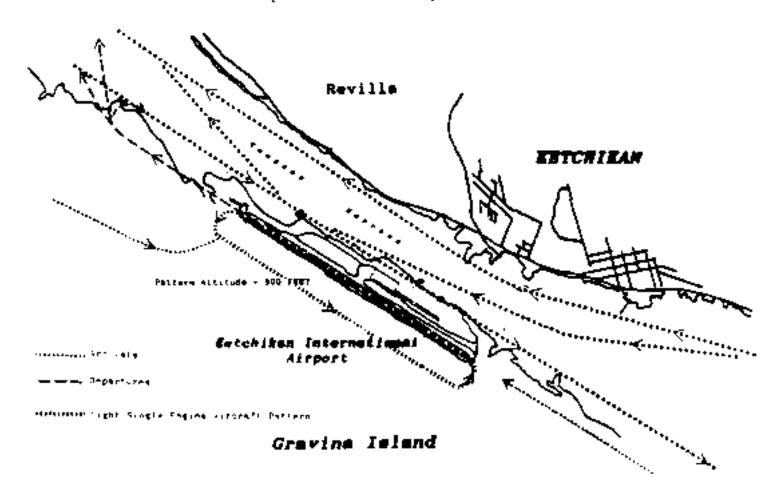
If WESTBOOKS, tuck dight and climb on course.

If <u>EASTBOUND</u>: Furn right and climb on course except remain clear of the approach course to Runway 29.

RUNWAY 29 ARRIVALS - Traffic pattern altitudes should be maintained until necessary to descend for landing unless observise required by the applicable distance from cloud criteria IFAR 31.105; AND:

If from the $\frac{687}{1}$: Enter from the west on a course south or otherwise clear of the Runway 29 departure course. Enter a left downwind for cumway 29 at a 45 degree angle; sequence with pattern traffic and successful on final to land Runway 29.

If from the <u>EAST OR SOUTHEAST</u>: Enter on a long final and land attracement unless there is conflicting traffic making right or left "taffic in which case, remain at pattern altitude and make left traffic in sequence to land Runway 29.



HELICOPTER

WEST WIND

RECOMMENDED VFR Arrival and Departure Patterns

Ketchikan, Alaska and Tongass Narrows Area

Departures: After take off, make a climbing right turn to 1000 feet AGL north of Peninsula Point and east of Ward Cove and:

If <u>EASTBOUND</u>: proceed east via a route at least 500 yards north of the Revilla shoreline.

If <u>WESTBOUND</u>: proceed west via a route over the Revilla shoreline north of the Tongass Narrows.

Arrivals:

If from the <u>EAST OR SOUTHEAST</u>: Proceed west to Peninsula Point at 1000 feet AGL via the Revilla shoreline (north of the Tongass Narrows). Descend in a right pattern north of Peninsula Point and east of Ward Cove and land at Peninsula Point.

If from the <u>WEST</u>: Proceed east to Peninsula Point at 1000 feet AGL via a route at least 500 yards north of the Revilla shoreline (north of the Tongass Narrows). Descend in a right pattern north of Peninsula Point and east of Ward Cove and land at Peninsula Point.

NOTE: If arriving or departing to or from locations other than Peninsula Point: The above routes are recommended with climb or descent patterns in the vicinity of the helipad and well clear of the floatplane routes over the Tongass Narrows.

All helicopter sling loads will be over water.

HELICOPTER CLIMB AND DESCENT PATTERN. PENINSULA POINT IS THE VISUAL PATTERN FIX BECAUSE 99% OF ALL HELICOPTER OPERATIONS ARE TO AND FROM THIS LOCATION.

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